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Amendments to the Claims:

1. (Currently Amended) An isolated DNA ~~sequence~~ molecule encoding a functional eukaryotic AHAS small subunit protein, wherein said DNA ~~sequence~~ molecule hybridizes to the complement of SEQ ID NO:1 under conditions comprising:

- (a) hybridization at 42°C for 20 hours in a solution comprising 50% formamide, 2X SSC, 5X Denhardt's solution, 1% sodium dodecyl sulfate (SDS), 0.05 mg/ml denatured salmon sperm DNA, and 0.05% NaPPi;
- (b) two washes at room temperature for 10 minutes in a solution comprising 0.4X SSC and 0.1% SDS; and
- (c) one wash at 65°C for 30 minutes in a solution comprising 0.2X SSC and 0.1% SDS.

2. (Currently amended) The isolated DNA ~~sequence~~ molecule of claim 1, wherein said AHAS small subunit protein is a plant AHAS small subunit protein.

3. (Currently amended) A plant expression vector comprising a promoter expressible in a plant cell operably linked to the DNA ~~sequence~~ molecule of claim 1.

4. (Original) A transgenic plant whose genetic complement comprises the plant expression vector of claim 3.

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5. (Original) A progeny plant of the transgenic plant of claim 4, wherein said progeny plant comprises said plant expression vector.
6. (Currently amended) An isolated DNA ~~sequence~~ molecule encoding the amino acid sequence set forth in SEQ ID NO:2.
7. (Currently amended) A plant expression vector comprising a promoter expressible in a plant cell operably linked to the DNA ~~sequence~~ molecule of claim 6.
8. (Original) A transgenic plant whose genetic complement comprises the plant expression vector of claim 7.
9. (Original) A progeny plant of the transgenic plant of claim 8, wherein said progeny plant comprises said plant expression vector.
10. (Currently amended) A plant expression vector comprising a promoter expressible in a plant cell operably linked to the DNA molecule comprising the sequence set forth in SEQ ID NO:1.
11. (Original) A transgenic plant whose genetic complement comprises the plant expression vector of claim 10.

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12. (Original) A progeny plant of the transgenic plant of claim 11, wherein said progeny plant comprises said plant expression vector.
13. (Currently Amended) A transgenic plant whose genetic complement comprises a heterologous promoter expressible in a plant cell operably linked to an isolated DNA ~~sequence~~ molecule encoding a small subunit of an *Arabidopsis thaliana* AHAS protein.
14. (Currently amended) A progeny plant of the transgenic plant of claim 13, wherein said progeny plant comprises said heterologous promoter operably linked to said DNA ~~sequence~~ molecule.
15. (Cancelled)
16. (Cancelled)
17. (Cancelled)
18. (Cancelled)
19. (Cancelled)

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20. (Cancelled)

21. (Cancelled)

22. (Currently amended) A transgenic plant whose genetic complement comprises a plant expression vector comprising a promoter expressible in a plant cell operably linked to an isolated DNA ~~sequence~~ molecule encoding an *Arabidopsis thaliana* AHAS small subunit protein.

23. (Previously presented) A progeny plant of the transgenic plant of claim 22, wherein said progeny plant comprises said plant expression vector.

24. (Currently amended) A transgenic plant whose genetic complement comprises a plant expression vector comprising a promoter expressible in a plant cell operably linked to a DNA ~~sequence~~ molecule encoding an *Arabidopsis* AHAS small subunit protein, wherein said DNA molecule comprises a sequence is selected from the group consisting of the DNA sequence set forth in SEQ ID NO: 1 and the DNA sequence set forth in SEQ ID NO: 3.

25. (Previously presented) A progeny plant of the transgenic plant of claim 24, wherein said progeny plant comprises said plant expression vector.

26. (New) A transgenic seed of the transgenic plant of claim 4.

27. (New) A transgenic seed of the transgenic plant of claim 8.

28. (New) A transgenic seed of the transgenic plant of claim 22.

29. (New) A transgenic seed of the transgenic plant of claim 24.

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